

Cupha prosope prosope

Butterfly &
Other
Invertebrates Club Inc.
Newsletter

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CLUB PLANNING AND ORGANIZING GROUP - 2001

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PLANNING AND ORGANIZATION MEETINGS

A quarterly meeting is scheduled in order to plan club activities and the newsletter.
See BOIC Programme.

CONTACT ADDRESS

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AIMS OF ORGANIZATION

- To establish a network of people growing butterfly host plants;
- To hold information meetings about invertebrates;
- To organize excursions around the theme of invertebrates e.g. butterflies, fireflies, ants, dragonflies, beetles, freshwater habitats, and others;
- To promote the conservation of the invertebrate habitat;
- To promote the keeping of invertebrates as alternative pets;
- To promote research into invertebrates;
- To encourage the construction of invertebrate friendly habitats in urban areas.

NEWSLETTER DEADLINES

If you want to submit an item for publication the following deadlines apply:

March issue – February 21st

June issue – May 21st

September issue – August 21st

December issue – November 21st



EDITORIAL

Welcome to our 22nd issue of the newsletter. As can be seen from the growing range of contributors, our newsletter is fulfilling an important role as a vehicle for discussion and information exchange. This is and will continue to be an important role for the Club. For the issues involved with invertebrate conservation to progress we need a broad sharing of information and experience. It is important that everyone feels that they can contribute, no matter how small that may be, to the advancement of knowledge about our invertebrate fauna and their ecological role. Thank you to all of you who are contributing to this process, and especially to the contributors to this issue of the newsletter.

Helen Schwencke

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Highlights of the Iron Range Expedition (Part 1)

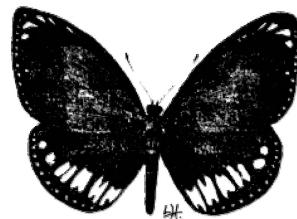
Mid-June may be a down time for insect activity south of the Tropic of Capricorn, but it is quite a good time for certain insects, especially butterflies, in far north Queensland. The writer and two other club members, Graham Forbes and Mike Barnett, had the good fortune to be able to travel by 4WD to Cape York Peninsula from the 12th to 23rd June 2001.

The trip involved stopovers at Mackay and Atherton for the first two nights. Then the “fun” began with corrugated and bulldusty gravel roads with other surprises such as sudden dips that materialized into creek crossings beyond normal braking capacity! Before we returned we had to contend with two punctured tyres, 4WD transfer case problems and a hole in the engine block due to a snapped piston conrod – but we made it back, and on time!!

Just over 100 km north of Laura we made our first “butterfly” stop at the Morehead River crossing. This river flows north-east into the North Kennedy River, which empties into Princess Charlotte Bay, the large eastern indentation that demarcates the true Peninsula (roughly equilateral triangle shaped) to the north of a baseline of latitude 14deg 30' south.

Conspicuous at this site were myriads of Dingy Bush-browns (*Mycalensis perseus*) and Lined Grass-yellows (*Eurema laeta*) flitting through the blady grass on the northern embankment. Also in good numbers were Chocolate Soldiers (=Brown Argus) (*Junonia hedonia*) and the No-brand Crow (*Euploea alcathoe eichhorni*), with its strikingly contrasting black and white livery [see illustration]. It was here that Mike and Graham had a “run in” with a large colony of the paper nest wasp *Ropalidia romandi*, which cut short the butterfly observations!

Our next stop was at Coen where we fuelled up and pondered whether we had time to climb nearby Mt. White, a well known butterfly hilltopping site. Time wasn’t permitting, and the dry conditions were unfavorable, so we continued our trip northward and made camp on the third night at the Archer River Roadhouse, the “gateway” to Iron Range National Park.



Euploea alcathoe eichhorni



The following morning we drove in, crossing first the westward flowing Wenlock River and then the eastward flowing Pascoe, with water just lapping the bottom of the doors in each case. We stopped on the northern bank of the Pascoe to admire several butterflies on the roadside. These included striking Blue Arguses (*Junonia orithya*), Copper Jewels (*Hypochrysops apelles*) and a lone skipper, the Bronze Ochre (*Trapezites macqueeni*), which was most elusive.

Further along at several smaller creek crossings we saw more and more tropical butterflies, including three “Aeroplanes” with their characteristic gliding flight. These were the Yellow-eyed, Black-eyed and Orange Planes (*Neptis praslini*, *Pantoporia*

venilia and *P. consimilis* respectively), plus the unpalatable “model” which the Yellow-eyed mimics, the Hamadryad (*Tellervo zoilus*) [see illustrations]. All except the Orange Plane are basically black and white insects. This is a common combination and

applies also to other groups such

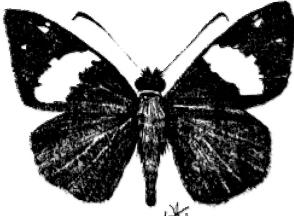
as the Satyrids (Browns) and Hesperiids (Skippers). The cryptic nature of this combination apparently gives these butterflies protection in conditions of dappled sunlight within the confines of the rainforest.

By mid-afternoon we arrived at the entrance to the park in a saddle opposite Mt. Tozer and another prominent hill. Then we crossed the Claudie River a number of times – only once by bridge! – and by late afternoon had reached the T-junction with the road from Lockhart River aboriginal settlement to Portland Roads on Cape Weymouth. By this time the fine and sunny conditions we had been experiencing began to be replaced by overcast ones, and wet puddles in the red muddy road indicated that rain was the order of the day. Our five day stay in the so-called “dry season” was anything but dry, although everyday, usually by late morning, the sun eventually appeared.

We went straight to the ranger station to present our permits, only to be told that “Mick was out and about”. We already knew this as we had passed him and spoken briefly on the road in! Mick Blackman and his wife Clare were most helpful during our stay – our camp being “next door” on Greg Daniels’ property, which we found most convenient – thanks Greg!



While we were pitching our tents and setting up camp generally, we were distracted by the presence of several attractive, red, white and black, Red-bodied Swallowtails (*Pachliopta polydorus*). These have an unusual flight pattern, with fast but gentle flapping wings supporting a strangely steady body (resembling a slow flying hawk moth or hummingbird), an easy target for a bird, but, due to its toxic properties, an unlikely one.

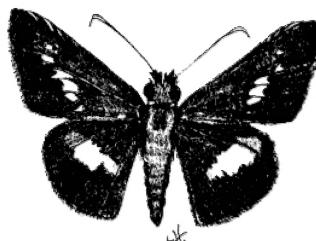


Notocrypta waigensis

namely the Banded Demon (*Notocrypta waigensis*), Black and White (or White-clubbed) Swift (*Sabera caesina*) and the Black and White (or Pied) Flat (*Tagiades japetus*) [see illustrations]. The small and delicate Black and White Ringlet (*Hypocysta angustata*) was also present, flitting slowly about in the understorey.

Our first “full” day at “the Range” was spent exploring the road into Portland Roads and generally getting our bearings. The black and white species of butterflies were again prominent with four “gliders” being present, those mentioned above, plus the Cape York subspecies of our familiar Common Aeroplane (or White-banded Plane) (*Phaedyma shepherdii*). As well we saw

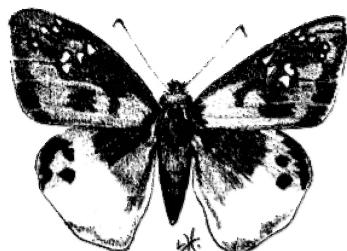
several black and white skippers,



Sabera caesina

Interesting as these were, not everything we saw was in shades of black and white, as every now and again we were treated to a sighting of

the spectacular metallic blue Ulysses Swallowtail (*Papilio ulysses*) as it “dive-bombed” us (?out of curiosity) whilst we were walking along the road! More elusive was the local subspecies of Northern (Cape York) Birdwing (*Ornithoptera priamus macalpinei*) of which we only had fleeting glimpses.



Tagiades japetus

More treats were to come, but the patient reader will have to wait until Graham takes over the pen, as Part 2, in the next issue.

John Moss



BUTTERFLIES OF THE MANGROVES

Mangroves and saltmarshes are important places in our environment. However, most people are not aware that even in these unusual environments there are butterflies to be found.

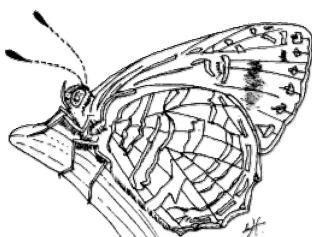
Samphire Blue (*Theclinesthes sulpitius*)

This tiny butterfly is less than 2 centimetres wide with its wings stretched open. When it opens its wings, they are purplish inside and grey-brown with tiny stripes on the outside. The Samphire (or Saltpan) Blue lays its eggs (shaped like miniature white mandarins) on Beadweed growing on the saltmarsh. The caterpillar's colour is very similar to the Beadweed's colour to help with camouflage. This tiny butterfly is common during October, November and December, flying and fluttering like tiny moths above the Beadweed in the saltmarsh of Jacobs Well.

Copper Jewel (*Hypochrysops apelles*)

This small butterfly is just less than 3 centimetres wide with its wings stretched open. When it opens its wings, they are orange with black edges but brown with orange and white stripes on the outside. The female Copper Jewel lays single eggs on the

underside of the leaves of 4 different types of mangroves (Grey Mangrove, Orange Mangrove, Yellow Mangrove and Spotted Mangrove). Hiding the eggs under the leaf helps protect it from other insects which might eat it.



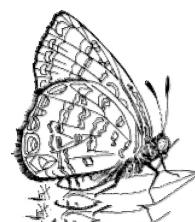
Hypochrysops apelles

The caterpillar eats the surface off the mangrove leaf during the night and then hides during the day in a curled-up leaf. Each caterpillar is protected by tiny black ants (*Crematogaster sp.*) which live in the hollow branches. These ants collect and eat a liquid (called a secretion) from the caterpillar's

back that is full of sugar and protein. In return, the ants protect the caterpillar from other insects (such as wasps) and spiders.

Mangrove Jewel (*Hypochrysops epicurus*)

This tiny butterfly is about 3 centimetres wide with its wings stretched open. When it opens its wings, they are purplish inside with black edges and brown with tiny orange and white stripes on the outside. The Mangrove (or Dull) Jewel likes to fly around the tops of the taller mangroves and rest on the leaves where it is difficult to see. The female Dull Jewel lays her eggs in small clusters on the leaves and stems of the Grey Mangrove.



Hypochrysops epicurus

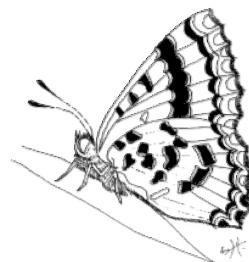
The tiny caterpillars eat the surface of the underside of the Grey Mangrove leaf so they can't be seen by insects, spiders and birds. When not feeding, the caterpillars hide in a curled-up mangrove leaf or holes in the branches.

Each caterpillar is protected by tiny black ants (*Anonychomyrma sp.*) which live in the hollow branches. These ants collect and eat a secretion from the caterpillar's back that is full of sugar and protein. In return, the ants protect the caterpillar from other insects (such as wasps) and spiders.

White-banded Line-blue (*Nacaduba kurava*)

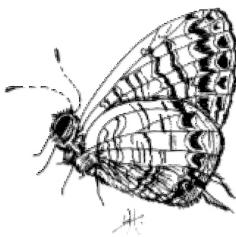
This tiny butterfly is just over 2 centimetres wide with its wings stretched open. When it opens its wings, the male is purplish inside and the female is pale silvery-blue with black edges. The outside of the wings is brown and white with tiny dark spots around the edge.

The female White-banded Line-blue lays her single eggs on the younger leaves of the River Mangrove. The small caterpillars are yellowish green and eat the underside of River Mangrove's leaves during the day for about 14 days. They then crawl down the tree to form their pupa in a dead curled leaf on the ground or in gaps in the tree trunk if the tide is in! By three weeks, the butterfly has emerged from its pupa.



Nacaduba kurava

Mangrove (Illidge's) Ant-blue (*Acrodipsas illidgei*)



Acrodipsas illidgei

This small butterfly is about 3 centimetres wide with its wings stretched open. When it opens its wings, they are purplish inside and brown with dark stripes on the outside. This butterfly is very rare and is hard to find as it usually flies around the top of taller mangrove trees. At this distance it is also easily confused with the Samphire Blue.

The small pinkish white caterpillar lives in the nests of small black ants (*Crematogaster sp.*) which are in hollow branches of some Mangrove trees. In return the ant collects and eats a secretion from the caterpillar's back that is full of sugar and protein. What the ants don't realize is that the caterpillar is not eating leaves but ant larvae and pupae. The caterpillar forms its pupa in the ant nest and when the tiny butterfly emerges from this pupa, it is covered in fluffy scales to protect it against the ants. After getting out of the ant nest, it stretches its wings and loses the fluffy scales.



Swamp Tiger (*Danaus affinus*)

This is a large black and white butterfly and at times it can be common in some places. It is easily distinguished from the Common Crow because the areas of white are larger and because of the reddish-brown markings on the underside of the wings.

The caterpillar is colourful with white and yellow spots on a dark background. The three pairs of filaments become red towards their bases. The chrysalis is similar to that of the Monarch and can be either green or pink. The caterpillar feeds on the leaves of Mangrove Milkweed. This is a trailing vine which can become a groundcover in more open areas. Sometimes caterpillars of the Lesser Wanderer will also be found feeding on this plant.

Glenn Leiper

CREATURE FEATURE

The Australian Rustic (*Cupha prosope prosope*)

I think one of the most amazing sights I have seen since studying butterflies, would have to be one I was fortunate enough to have observed back in February this year.



I went to one of the re-vegetation sites that I have been involved in to assess the weed growth, when I noticed movement around one of the three Flintwood (*Scolopia braunii*) saplings which we had previously introduced into the park.

Never having seen the Australian Rustic in this park before, we once again proved that by planting the right plants in the right places, the wildlife associated with those plants, in this case butterflies, will soon follow.

The amazing thing about this butterfly, was not that it appeared in the park, but the way in which the female deposited her eggs.

I crept up as close as I could without disturbing the butterfly, so I could see if she actually oviposited – (laid an egg). Every time she put her abdomen under a leaf – the normal place butterflies deposit eggs, I moved in for a closer look, but no eggs!

I must have watched her for ten minutes as she walked from one side of the plant to the other, touching her abdomen on the leaves and branches as she went. She would walk along the branch, upside-down and then back up the right way again, dragging her abdomen at differing intervals. When she flew to the other side of the plant, I took the advantage and searched very thoroughly where she had been earlier, but to no avail. I couldn't find any eggs. I moved slowly around the tree to once again observe her strange movements. This time I wasn't going to take my eyes off of her.



Then it happened, a single, small, greenish coloured egg was glistening in the sunshine on the underside of a leaf. I took note of where it was and continued to observe the adult as she danced around the plant. Then I saw it again, another egg, an exact replica of the first, but not on the underside of a leaf, as with the first, this time it was in a spiders web!

I moved back a bit to take in the whole plant and there they were, eight, nine, ten separate eggs and all in spiders webs! It turned out that what she was doing, was walking along the branches and leaves until she found a spiders web, she would then swing her abdomen to very quickly touch the web, sticking an egg in it. It was happening so fast, I was actually missing it!

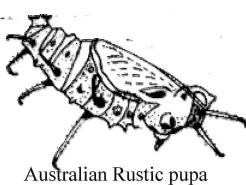
How safe would these eggs be? I am sure that if I was a predatory insect, I wouldn't go near the eggs. But what about the caterpillars that emerged from the eggs? Surely the spiders would eat them.

No, not at all. As soon as they ate their way free of their eggs, they attached a life-line to the spiders webs and like a group of abseilers, they lowered themselves slowly down until they found a leaf or branch of the food plant.

How do they know what to eat? There is every possibility that they could have abseiled onto the wrong plant.

After talking it over with a few more "butterfly observers," we deduced that maybe the dance she was performing on the plant, with the dragging of the abdomen, was actually her way of putting the scent of the foodplant onto the eggs. The larvae on emerging would then eat their eggshells, hence getting the taste of the foodplant imprinted in their sensory organs.

I took a couple of the eggs home and placed them on a Flintwood I have in an eight inch pot – I keep a variety of larval foodplants in pots, so that I can observe life cycles of butterflies in the relatively "predator free" environment of my shade-house.



Australian Rustic pupa

The larvae are a greenish colour and seem to be quite hairy. These hairs are in fact non-irritating, almost black spines. The pupae look like they could be used for Christmas tree decorations. They are green, with ten slender spines of various sizes along the body, these are bent on the ends and seem to be set in silver on the pupa. The spines are brown with black areas on both ends.

The adult butterfly is first noticed as being a fairly small, orange one, which seems to prefer slightly shady areas. The upper wings are dark brown on the outer edges, then there is a band of orange and then finally a dark-caramel colour is closest to the body.



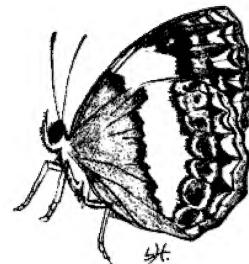
The underside of the butterfly is an all-over caramel colour. The hindwing has seven black spots enclosed in a scalloped pattern, which possesses a purplish sheen. The forewing has one prominent black spot and approximately four small black spots toward the leading edge. The over-all size of this butterfly was only five centimeters from wingtip to wingtip.

There are three foodplants listed for the larvae of the Australian Rustic, these are: *Flacourtia jangomas*, *Scolopia braunii* and *Xylosma ovatum*.

My preference, as mentioned previously, is for *Scolopia braunii* and this is available at times from the nursery at Barung Landcare, Maleny.

Further information on this subject can be had by reading, "Butterflies of Australia," by Common and Waterhouse, 1981 and "Butterflies of Australia" by Michael Braby, 2000.

Bob Miller



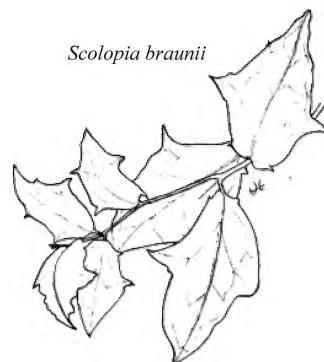
Australian Rustic adult

PLANT PROFILE

Foodplants of The Rustic (*Cupha prosope prosope*)

This is a brightly coloured active butterfly which can be successfully attracted to gardens even in Brisbane although it is a lot easier north of Maryborough. Once established the butterflies will remain throughout the year.

The key to holding a colony of these butterflies in a garden is to be able to provide fresh shoots of their foodplants as the larvae cannot eat the old (green) leaves. The female butterflies are always walking over stems of the foodplant looking for fresh shoots on which to lay their eggs. I use five foodplants namely *Scolopia braunii*, *Flacourtia inermis*, *Flacourtia* sp. (Shiptons Flat), *F. territorialis* and *Xylosma terraereginae* to ensure that some fresh shoots are always available. All are rainforest plants and grow readily although germination of *Flacourtia* seeds can be a problem.



Scolopia braunii

Scolopia braunii – this is the main native foodplant.

It is a medium size tree and once the tree is established it puts out numerous suckers which are very attractive to the butterfly. This plant is essential as a source of red fresh growth during the colder months. It is not particularly suited to a home garden



as it is large, densely foliated and it does sucker profusely but it is quite suitable for a rainforest garden.

Xylosma terraereginae – this is the *Xylosma* from S.E. Qld. and is a small, neat shrub suitable for home gardens. The butterflies are only sporadic on this plant seeming to prefer the *Scolopia* and *Flacourtie* type bushes which produce red new growth.

Flacourtie inermis – this is a S.E. Asian shrub with large leaves (20cm). The red new growth is extremely attractive to the butterflies and they constantly fly around this bush. In Brisbane however new growth is only produced October – April which limits its ability to hold a permanent colony.

Flacourtie sp. (Shiptons Flat) – this is a small tree from Cape York which is suitable for the home garden. During the warmer months numerous fresh red shoots are produced which are very attractive to rustics. The tree also produces edible berries.

Flacourtie territorialis – this is a Northern Territory plant and is the foodplant of the Leopard (*Phalanta phalantha*) however Rustics will also use this plant when a large amount of fresh shoots are available. It is only a small straggly shrub which can easily be grown in a home garden provided it is trimmed to keep it in shape.

Presence of the larvae is usually detected by freshly eaten new growth. The larvae usually rest during the day under an old leaf further down the stem, older larvae will feed openly during the day. If disturbed larvae drop off the leaf and hang on a thread. Pupae are usually found away from the last feeding site under an old leaf often on another plant.

Dennis Bell

Ed. Note – Two of the above observations are new Australian hostplant records for the Rustic (viz. *Flacourtie territorialis* and *F. inermis*). Both are known hostplants for the Leopard butterfly, but within Australian limits do not occur within the range of the Rustic.

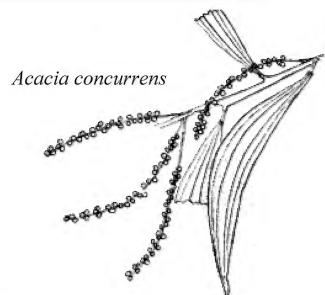
Scolopia braunii is available from Toona Rainforest Gardens, Mudgeeraba Q 07 55305299

CREATURE NOTE

The Moth *Gnamptoloma aventiaria* (Geometridae)

During a survey, by Bob Miller and the writer, of lycaenid larvae feeding on flowerbuds of the wattle *Acacia concurrens*, near Landsborough South-east Queensland in May 2000, a small but interesting geometrid larva was found.

This “looper” cryptically shaped and patterned in green and





Larva – enlarged x5

yellowish-brown was as difficult to see on the blossoms as were the larvae of the four species of lycaenids encountered. The lycaenids were *Prosotas felderi*, *P. dubiosa*, *Sahulana scintillata* and *Nacaduba biocellata* (Felders, Small Purple, Glistening and Double-spotted Lineblues) – which all had very similar larvae shaped and coloured like the flower buds on which they were feeding.

These will be the subject of another article.

The larvae are more easily obtained by shaking or beating the flowers over a sheet placed under the tree, but Bob and I found it a challenge and more “sporting” to find them by peering into the flower spikes! (Sceptics may accuse us of not bringing a beating sheet!!)

The adult moth, *Gnamptoloma aventiaria*, is about 25 mm across the outspread forewings, and has at least three colour phases – olive green, tan and reddish-brown. As can be seen from Lois Hughes illustration the forewings are unusually scalloped on the outer margin near the apex, whilst both fore and hind wings are quite angular. There is a good colour illustration in Common’s Moths of Australia (1990).



Moth - actual size



Pupa – enlarged x 3

Common records the species distribution from north-western Australia and the Northern Territory, and from Cape York Peninsula to northern N.S.W. It also occurs in India, Sri Lanka, Taiwan and south-east Asia. There is no mention of a host plant in Common, so it appears that this is the first such record for Australia.

A second species of moth larva (about 12mm long) was also found on the flower buds. This species has a most unusual habit of carrying its faecal pellets on the ends of the setae (body hairs) looking much like a pin cushion. No doubt this is an effective way of disguising itself – i.e. the cryptic appearance of dead or discoloured flower buds.

The presence of at least 4 butterfly and 2 moth larvae on this *Acacia inflorescence* is an indication of the species diversity that is often overlooked when we admire the pretty wattle flowers from a distance. I am sure many more species await to be discovered in this and similar situations.

John Moss



REVIEW

Pine Rivers butterfly brochure/poster

This publication packs a lot of information into a small space and still manages to look attractive. There is basic information for beginners such as on the butterfly lifecycle but everything is still scientifically accurate.

The poster takes up one whole side and lists sixty-one butterflies and the host plants for their caterpillars. Twenty-three of these butterflies are illustrated with photos. This provides useful information for those contemplating a butterfly garden.

It was good to see that some caterpillar photographs were included and that the mistletoe butterflies were not left out. While there are several books covering all of Australia's butterflies this poster concentrates on those to be found in the Pine Rivers Shire. The Shire Council is to be commended for producing this brochure/poster and no doubt many people will date the beginning of their interest in butterflies from when they first saw it.

Frank Jordan

YOU ASKED

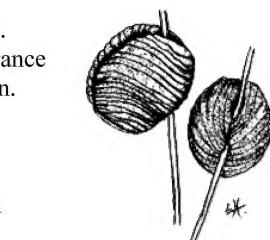


I found these interesting cocoons on a shrub in my garden. They are a dull gold colour but have a shiny silken appearance like spun thread. I would like to know what they contain.

Anon.



These are the egg cases of the praying mantis and contain dozens and dozens of potential young. Don't do as I did and allow them to hatch inside! They were everywhere, scurrying over books, pens, walls etc. They feed on caterpillars and also wait in ambush on leaves and flowers for flying insects to alight.



Praying Mantis egg case

Lois



What kind of spider makes these kind of egg sacs? The spider is a pale flesh colour, about the size of a thumbnail with coloured dots over the abdomen and raised bumps.



The babies are coming out now. The female fell victim to a huntsman who is now occupying her nest site.

I figure the egg sacs are pretty distinctive for the species/genus.



Hopefully you can identify the spider for me?

Thanking you

Pearl



Judging by the large raindrop sized egg sacs you probably have a Bolas or fishing spider. It is an amazing spider which has managed to mimic the scent that female moths use to attract their mates. At night time it lets out a line of web like a fishing line which it can twirl around when a male moth approaches too close. Large sticky drops on the line then ensure the moth does not escape.

The young spiderlings are also interesting because after hatching they can also let out a line of silk web. But this web is caught by the wind and floats the young spider off to a new location.

Geo Magazine volume 8 number 1, March 1986, has an article on this remarkable spider if you would like further information.

Frank

Ed. Note: We hope to have an article on this spider, with illustrations, in our next issue.

LETTERS

The Editor
Butterfly and Other Invertebrates Club Inc.

Garry Sankowsky
P.O. Box 210, Tolga
Qld. 4882
19th August 2001

Dear Daphne,

Firstly I would like to commend James Beale on his article on growing *Aristolochia tagala*.

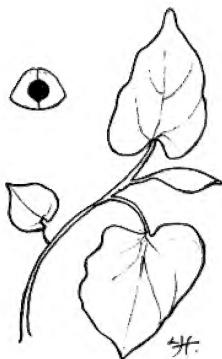
As a horticulturist and experienced butterfly breeder I would like to pass on a few comments and add some useful information. For many years I have advocated that growing *Par aristolochia praevenosa* was a waste of time for the average gardener. Because of this the 'Save the Richmond Birdwing' campaign has completely lost impetus. Numerous people have reported to me their disappointment because the vine would simply not grow at a reasonable rate.

The *Aristolochia tagala* vine is certainly best when planted in shade but must be able to climb into the sun later on. If you want *Cressida* larvae to attack them, then they should be in full sun, but this can be a major disadvantage as the vines may never survive the continuous onslaught from *Cressida*. This is why growing them on a trellis is not very successful. One very good reason not to grow *Aristolochia* on a trellis is that the Richmond Birdwing (and all other Australian Birdwings) prefer to lay their eggs on the leaves on the tree on which the vine is climbing.



This serves two purposes:

1. the eggs are not eaten by the larger larvae already on the vine
2. when Birdwing eggs are laid on new growth of *A. tagala* the vine reacts to the “egg glue” with a flow of sap which covers the egg and resulting mould kills it.



Juvenile *A. tagala* showing heart shaped leaves. Seed is also heart shaped.

One way to avoid this is to plant several vines on the same trellis.

Fertilising is very important. Let me explain the difference between ‘slow release’ and ‘controlled release’ fertilizers. Osmocote and Nutricote type fertilizers are coated fertilizers which have a controlled release. These are for **potted plants** and are of little use in the garden, or they can actually be toxic to the plants.

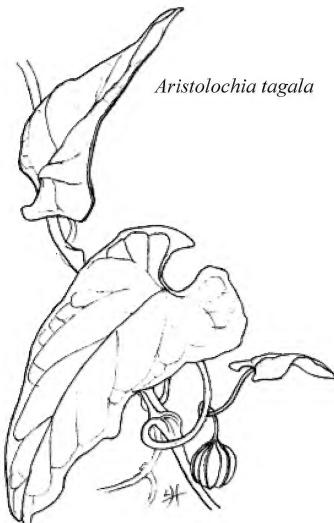
The best slow release fertilizers are usually synthetic organic materials which last for about 3 months and the main types are:

Triabon – this is a fully balanced fertilizer with 16% nitrogen and all the essential macro and micro nutrients. After extensive testing, I am convinced this is the very best fertilizer you can buy. The synthetic organic nitrogen compounds do not burn plants and their release is independent of pH and temperature. Triabon is imported by Yates and available through outlets such as Grow Force.

IBDU (Isobutylidene Diurea) produced by Paton Fertilizers is 31% nitrogen with no other nutrients. It is very good for boosting plants after they have been defoliated by butterfly larvae. It is also available through Grow Force.

Rates: for both these use about 20g per plant in the garden and 5g per 140mm pot.

Controlled release fertilizers such as Osmocote and Nutricote must be watered every day, or at least, every second day to distribute the nutrients. After the first watering the nutrients continue to release and if they are not diluted and distributed with water they can burn the plants. Placing this type of fertilizer in the hole when planting plants is an extremely **BAD** habit. A slow release fertilizer would be fine.



Aristolochia tagala



One golden rule you should always remember that for native plants, the ‘Water Soluble Phosphorus content’ of any fertilizer should be less than 3%.

Both slow release and controlled release fertilizers are very expensive and will set you back about \$120.00 for a 25kg bag. They are definitely worth it!

Butterfly food plants cannot have too much nitrogen. Nitrogen is the protein source for the larvae. A well fertilized plant will result in a large healthy butterfly. You **cannot** have excess nitrogen in a plant. A plant can only make use of a certain amount of any nutrient and usually the amount of any one compound is related to the balance of all the other compounds. Nitrogen produces wood and foliage and this is what is needed on a butterfly food plant. Excess nitrogen in instantly available form such as ammonium nitrate will burn the roots and kill a plant but with slow release fertilizers the nutrients will simply be wasted. Phosphorus is the element to be careful of with native plants. Rates of more than 5% can be lethal or cause severe leaf burning. Watch this carefully when selecting fertilizers. As a general rule you will need at least 10% nitrogen (12-16% is better).

If you have a large garden (1 hectare or more) you can use a cheaper, but instant, fertilizer to keep your food plants healthy. From extensive testing I have found the best one to be Nitrophoska Blue Special an Incitec product. It is a ‘pril’ type fertilizer where each pril contains all the nutrients but with no coating to slow down its release. It should be scattered throughout the garden (like feeding the chooks) and watered in over a couple of days. This one costs about \$40 for a 50kg bag.

Two other products suitable for native plants are CK77S (Incitec) and Booster Force 450 (Grow Force). These are blended fertilizers (separate bits for each nutrient) and much cheaper at about \$35 for a 50kg bag.

Be warned! With these instant fertilizers you can kill plants by dropping a handful at the base of the plant. They should always be scattered evenly and **must** be watered in or all the nitrogen will escape.

Disease Control: *Aristolochia tagala* should be able to cope with poor drainage. In its natural habitat it is often in very wet and boggy situations. If you have the root fungus, Phytophthora, in your soil you will need chemicals such as ‘Antirot’. Other similar products are: Foli-R-Fos, Fongarid, Ridomil, Phospot and Phosject. Phytophthora cannot be eliminated, only controlled. Plenty of mulch also helps to control it.

Garry Sankowsky

Special offer to Club members

My garden has been established for about 20 years and each year I get a large number of seedlings coming up. If any members would like some of these seedlings of



butterfly host plants please send me a self-addressed Australia Post Air Bag (this can be sent folded up inside a ‘business’ envelope (22 x 11mm). Please advise which host plants you would like, or host plants for which butterfly would get better results. For instance I have numerous seedlings of various *Melodorums* each year but no *Aristolochias*. Foodplants for Tigers, Crows, Triangles, Swallowtails, Common Migrant (seed), Yellow Migrant (seed) and many others. These seedlings can be potted up and grown on for planting out in the garden.

If you send an overnight bag for plants, please advise any times you may be away as according to Murphy’s Law I will send them when you are on holidays.

Plants will be sent sometime over the coming summer.

Send to: Garry Sankowsky, PO Box 210, Tolga Qld. 4882

Ed. Thank you Garry for your generous offer.

PROJECT PROFILES #1

Butterfly Habitat - Dutton Park

Many people would like to see what a particular host plant looks like before they grow it in their garden. This is also particularly useful for people involved in revegetation projects.

The butterfly habitat at Dutton Park is an attempt to grow examples of as many different species of host plants as is possible, specifically those that are compatible with the site. It is intended to include 50 to 80 species when completed.

In most cases only a few examples of each plant species will be grown. From these people will be able to see if they are suitable for the sites they are working on. Some of the plants, however, have done so well already that larger numbers will be planted. This may enable a colony of the butterfly species to establish on the site. Hopefully this will provide an inspiration to any visitors.

Some butterfly species have already been breeding on the site. They are marked with an asterisk in the list below.

These priority species planted for demonstration at Dutton Park are -

Blue Tiger on *Secamone elliptica*

Leafwing* on *Pseuderanthemum variabile*

Yellow Jewel on *Pomaderris lanigera*

Common Crow* on *Parsonsia straminea*

Blue Triangle* on *Cryptocarya triplinervis*

Chequered Swallowtail* on *Cullen tenax*



Orchard Swallowtail* on *Flindersia australis*

Caper White* on *Capparis arborea*

Jezebel Nymph* on *Pipturus argenteus*

Richmond Birdwing on *Pararistolochia praevenosa*

Evening Brown* presently on Green Panic but soon on *Themeda australis*

Large Grass-yellow on *Breynia oblongifolia*

The project is a joint one between our Club and the Dutton Park Scout Group.

Eventually it is intended that courses and workshops will be based around the plants and butterflies on site.

The site has been difficult to rehabilitate because it was heavily overgrown with weeds and a lot of building rubble had been dumped there in the past.

The construction of some handcrafted paths, making creative use of some of the building rubble, are nearing completion.

An open day will be held to publicise the habitat to the local neighbourhood in the near future. Interested people are welcome to become involved in the project now that the experimental plantings have proven successful.

The site is at one end of the Riverside Bikeway and just below the playground and picnic area of Harmony Gardens. It is hoped that it will become a popular recreational destination.

Frank Jordan

Ed. Note: To be featured in a future issue: the Swordgrass Brown butterfly re-introduction at Yugarapul Park

If you want your project featured here please contact the editor.

NATURE NOTE

People are always asking what native plants they can grow as nectar sources instead of buddleia, lantana etc. Unfortunately, few of our native plants are grown in suburban gardens where people can watch them to see if they do attract butterflies.

David Barnes has many different native plants in his garden and has noticed that the flowers of the Spindly *Baeckea* attract adults of Common Crow, Blue Triangle and Varied Eggfly butterflies.

It grows to about two metres and flowers mid spring to autumn. Coming from the wallum country of the Moreton and Wide Bay districts, it may be difficult to grow in some situations.

Its scientific name is *Baeckea crenulata* but was also known as *Baeckea imbricata*. By now it probably has a new scientific name.



Hopefully other people who grow some of our more obscure native plants will also let the club know if they notice good nectar sources in their gardens. This knowledge can then be shared with other members.

Those people wanting to actually eyeball this plant will be able to do so because David & Margery's garden is part of Australia's Open Garden scheme. Check the programme page for details.

Frank Jordan

ITEM OF INTEREST

This article appeared in a Sunshine Coast newspaper.

“Rare colony has fanatics in a flap”

“Kin Kin plans for eco tours given a flying start

Local lepidopterists are in a flap over an *Ornithoptera richmondia* population north of Tewantin. English translation: butterfly fanatics are thrilled with the discovery of a Richmond Birdwing butterfly colony at Kin Kin Creek.

The discovery is thought to be the most northerly population of the species, and throws weight behind a green group's push to establish eco-tours in the Noosa hinterland.

Queensland Museum entomologist Geoff Monteith said the Birdwing's distribution once ranged from near Grafton in New South Wales up as far as Maryborough, but that area had diminished in recent years.

New research by the state's most esteemed Birdwing expert, Dr Don Sands of the CSIRO, suggests the Kin Kin Creek area should be preserved.

“As this population represents the northern limit of the species range and is isolated from colonies to the south, its conservation is of the highest priority,” he said.

And our local butterfly boffins are bursting out of their cocoons over the find.

“It's quite exciting ... its distribution has dropped tremendously from what it used to be,” Landsborough enthusiast Bob Miller said.

He said the only other location he knew of on the Coast was in the Mooloolah region.

Beerwah expert Arthur Powter said the butterfly's presence helped conserve the native vegetation.

Sunshine Coast Environment Council president Darryl Fry said the find was great news for eco-tourism. “We've got the resource, so now we've just got to make it happen,” he said.

“This (butterfly) adds to an already impressive list of threatened species in the area, adding yet another reason for eco-tourists to visit,” he said.



Mr Fry estimates the eco-tourism industry could be worth up to \$20 million for the region, and said support from hinterland communities for the concept was strong.

He said the Kin Kin Creek rainforest was also home to the critically endangered Coxen's fig parrot, a rare rainforest hawk and the Powerful Owl – Australia's largest."

WORLD WIDE WEB SITES TO WATCH

Two of our members have web sites which are well worth a visit.

1. Don Herbison-Evans site on butterfly life histories with colour images of larvae, pupae and adults is at <http://www.usyd.edu.au/macleay/larvae/>
2. Ross Kendall has set up a butterfly business supplying pupae to the general public and educational kits to schools. www.butterflyencounters.com.au
3. The August Newsletter of the Western Australian Insect Study Society Inc mentions an interesting ant site: www.ozants.com also accessible via www.ento.csiro.au/science/ants

LIBRARY BOOKS FOR LOAN

The following books are currently available for loan at meetings:-

Australia's Butterflies, by Peter Wilson

Butterfly Magic, by Helen Schwencze and Frank Jordan

Australian Cicadas, by Max Moulds

Butterflies of Australia, by Common and Waterhouse, 1981

Butterfly Watching, by Paul Whalley

Flying Colours, by Mike and Pat Couper

All Colour Book of Butterflies, by Robert Goodden

Lifecycle of the Ulysses Butterfly, Video, by Janet Richardson

Lifecycle of the Cairns Birdwing Butterfly, Video, by Janet Richardson

BACK ISSUES

Back Issues of the Club Magazine are available at a cost of \$1 each plus postage (3-6 copies - \$1.50. 1-2 copies \$1.10)

ADS AND EXCHANGES

Sometimes you may have an oversupply of butterfly larvae and your food supply will not hold out. If this happens, contact Rob MacSloy - 07 3824 4348 - who operates the



Register of Host Plants. He can put you in touch with prospective "foster parents". Have YOU advised Rob of the host plants you have available?

The poster, Swallowtails of South East Queensland, compiled by the BOIC, can be obtained from BOIC, PO Box 2113, Runcorn, 4113. The cost for members is \$8 plus \$5 postage and handling. Non-members \$12 plus \$5 postage handling.

"The Laced Fritillary" a painting by Lois Hughes. Prints now available. Phone Lois on 3206 6229.

See Garry Sankowsky's host plant offer in Newsletter.

OTHER GROUP'S ACTIVITIES

Visit of Denver, Colorado, U.S.A. Butterfly Club. October 27th to 31st, 2001.

A group of 19 of our American colleagues will be visiting Australia in October/November, initially spending 6 days in the Cairns area, then 5 days in South East Queensland and finally another 6 days in the Melbourne area. John Moss will be their guide for the Brisbane leg wherein they will be spending time at O'Reilly's Green Mountains (with two overnights at the guest house) followed by a visit to some of our members Brisbane butterfly gardens, Mt. Coot-tha, Mt. Glorious Biological Centre, Jacobs Well Swordgrass Brown butterfly site, Venman's Bushland National Park and the Indigiscapes Centre in the Redland Shire. There will be a report on this visit in the December Newsletter.

BUTTERFLY AND OTHER INVERTEBRATES CLUB PROGRAMME

September – December 2001

Tweed Valley Excursion

When: Sunday, 30th September, 2001 – meeting at 11am
Where: Meet outside the Cudgen Headland Surf Club at Kingscliff. UBD Map Ref. (Gold Coast Section) Map 93 G20
Directions: Travelling south on the Pacific Highway, turn left at the first Kingscliff sign, once across the new Tweed River bridge. Pass back under the highway and turn second left at Wommin Bay Road, which again passes under the Highway, and follow the road as it curves right into Marine Parade. Continue on south past the Bowls Club on the left and shops on the right. Just past the Caravan Park is the Seaview St. roundabout, marked by a large fig tree – the Surf Club and Lions Park are on the left. Park there or opposite outside the shops.
What: We will be visiting the Cudgen Nature Reserve and Pottsville Environmental Park. Greg Newland of Tweed Shire Council, a



clubmember, will be our guide. If time permits we may visit his butterfly hostplant site at the Tweed Valley Lawn Cemetery and Gardens.

R.S.V.P.: Contact John 3245 2997

Planning meeting and information exchange

When: Wednesday, 10th October, 2001, 7.00 pm

Where: John's Place, contact John for details

RSVP/Contact: John 3245 2997 for details of location

All members are welcome to these meetings. They are interesting as there are usually many things to discuss.

Australia's Open Garden Scheme – David and Margery Barnes' Garden

What: David & Margery Barnes' Open Garden. David and Margery have done a magnificent job of developing a wildlife garden, including butterfly host plants on a small suburban block. Our Club will be holding a stall and display. Please come and see this garden and make our acquaintance or catch up with us.

When: Weekend of the 13-14 October 2001, 10am - 4.30pm both days

Where: 52 Bellicent St., Bracken Ridge

Light refreshment will be available.

Kholo Reserve near Pine Mountain, Ipswich

When: Sunday 4th November, 2001, starting at 10.00am

Where: Meet at Kholo Botanic Gardens (also marked as Mining Museum on UBD Map Ref. 192 N13) Riverside Drive, Kholo. From there we will drive to the access point.

What: The club has had three previous visits to this area of dry rainforest on the Brisbane River, the last in February, 2000. (See reports in issues # 13, 15 & 16). A total of 47 species of butterflies have been observed in the reserve including the Rare Red-eye (now Ornate Dusk-Flat) *Chaetocneme denitza*, but doubtless more are awaiting discovery. As in the past, the results of this trip will be passed onto the Ipswich City Council for their biodiversity records.

Bring: Lunch, water, long trousers, sturdy shoes, hat, insect repellent and binoculars.

RSVP: Contact John 3245 2997 or Helen 3844 6677

Stockyard Creek, end of year BBQ and insect light trap

When: Saturday, 1st December, 2001, 4pm

Where: Stockyard Creek Reserve on Alperton St., Burbank (UBD Map Ref. 203 E14)

What: This end of year Club get together is to a new Brisbane City Council reserve which the Club last visited in February this year. There are excellent picnic/BBQ facilities and a pleasant creekside walk which early comers may like to avail themselves of. We have seen the Painted Skipper (*Hesperilla picta*) on the wing amongst the Sawsedge, *Gahnia clarkei*, at this time of the year. After nightfall we hope to run a mercury



vapour lamp, ultra violet light trap to experience the diversity of insects in the reserve.

Bring: BBQ food for cooking, drinks, hat, insect repellent, dark glasses (Potable tank water on site)

RSVP: Contact John 3245 2997 or Helen 3844 6677

If you plan to attend any of the above events please respond to the person indicated in case, for some unforeseen circumstance, the event has had to be postponed or cancelled.

DISCLAIMER

The Newsletter seeks to be as scientifically accurate as possible but the views, opinions and observations expressed are those of the authors. The Newsletter is merely a platform for people to express their views and are not necessarily those of the BOIC. If inaccuracies have inadvertently occurred and are brought to our attention we will seek to correct them in future editions. The Editor reserves the right to refuse to print any matter which is unsuitable, inappropriate or objectionable and to make nomenclature changes as appropriate.

ACKNOWLEDGMENTS

Producing this newsletter is done with to the efforts of:

- Those members who have sent in letters and articles
- Lois Hughes who provides illustrations including the cover
- Daphne Bowden who works on layout, production and distribution
- John Moss for scientific referencing and proof reading
- Helen Schwencke who developed the overall design
- Frank Jordan for inspiration

We would like to thank all these people for their contribution

ARE YOU A MEMBER

Please check your mailing label for the date your membership is due for renewal. If your membership is due, please renew as soon as possible.

Membership fees are \$12.00 for Individuals/Schools and \$17.00 for family membership.

Butterfly and Other Invertebrates Club Inc.

c/- PO Box 2113

Runcorn Q 4113

Next Meeting: Sunday 30th September, Tweed Valley Excursion

